## IOWA DEPARTMENT OF TRANSPORTATION

To Office Bridges and Structures Date July 6, 2005

Attention All Employees Ref No. 521.1

From Gary Novey

Office Bridges and Structures

Subject Method's Memo No. 138 (Revision to 91 - Temporary Shoring Adjacent to Roadway)

The Construction Office has expressed concern that the Contractors may misinterpret the office's temporary shoring note for Zone 2 (Note E171/M171) or Zone 3 (Note E172/M172) and assume the offices shoring criteria is all they are responsible for. Therefore, E171/M171, "Earth retention, Temporary shoring" note for Zone 2 and E172/M172 "Earth retention, temporary shoring, PE required" note have been revised as shown below. Please use this note on all plans where temporary shoring under Zone 2 or Zone 3 criteria is required.

## E171/M171: Earth retention, temporary shoring

THE CONTRACTOR SHALL PROVIDE TEMPORARY SHORING (SHEET PILE OR OTHER) TO PREVENT THE EARTH UNDER THE TRAFFIC LANE, FROM SLOUGHING IN DURING CONSTRUCTION. ALL COST OF SHORING, WILL BE CONSIDERED INCIDENTAL TO CONSTRUCTION AND NO DIRECT PAYMENT WILL BE MADE. ALL MATERIAL USED FOR SHORING SHALL REMAIN THE PROPERTY OF THE CONTRACTOR. SHORING IS TO BE REMOVED ONLY AFTER BACKFILLING HAS BEEN COMPLETED. THE CONTRACTOR SHALL SUBMIT SHORING PLANS FOR REVIEW. IN ADDITION TO THE REQUIREMENTS NOTED ABOVE, ARTICLE 1107.07 OF THE STANDARD SPECIFICATIONS STILL APPLIES.

## E172/M172: Earth retention, temporary shoring, PE required

TEMPORARY SHORING (SHEET PILE OR OTHER) SHALL BE REQUIRED AS NECESSARY TO PREVENT THE EARTH UNDER THE TRAFFIC LANE FROM SLOUGHING IN DURING CONSTRUCTION.

THE CONTRACTOR SHALL SUBMIT A TEMPORARY SHORING PLAN TO THE ENGINEER FOR APPROVAL. THE TEMPORARY SHORING PLAN SHALL BE DESIGNED AND CERTIFIED BY A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF IOWA. THE CONTRACTOR SHALL SUBMIT 6 COPIES OF PLANS FOR TEMPORARY SHORING. THE ENGINEER WILL BE ALLOWED 30 CALENDAR DAYS TO REVIEW THE TEMPORARY SHORING PLAN. THE CONTRACTOR SHALL NOT PROCEED WITH INSTALLATION OF THE TEMPORARY SHORING WITHOUT NOTICE TO PROCEED FROM THE ENGINEER.

THE TEMPORARY SHORING SUBMITTAL SHALL INCLUDE:

- DESIGN CALCULATIONS (INCLUDING A GLOBAL STABILITY ANALYSIS)
- SOIL PROPERTIES
- SHORING MATERIAL PROPERTIES
- SHORING PLAN LAYOUT (SHOWING LOCATION OF TRAFFIC)
- SHORING DETAILS

TEMPORARY SHORING SHALL BE PAID FOR AS A LUMP SUM INCLUDING ALL COST FOR DESIGNING, FURNISHING, INSTALLING AND REMOVAL. ALL MATERIAL USED FOR SHORING SHALL REMAIN THE PROPERTY OF THE CONTRACTOR. SHORING IS TO BE REMOVED ONLY AFTER BACKFILLING HAS BEEN COMPLETED. IN ADDITION TO THE REQUIREMENTS NOTED ABOVE, ARTICLE 1107.07 OF THE STANDARD SPECIFICATIONS STILL APPLIES.

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